EBIO 316: LAB MODULE IN ECOLOGY

Fridays from 1PM to 5PM - 211B Anderson Biological Laboratories

Instructor

Dr. Kelly Weinersmith
E-mail: Kelly.L.Weinersmith@Rice.edu
Office: 211A Anderson Biological Laboratories
Office hours: You are always welcome to come by my office, but I can't guarantee I'll be available if you drop by unannounced. Please e-mail me to set-up a time to meet.

Course evaluations are due at the end of the semester, when it's too late to fix anything that isn't working. I would like to know if something about the class is not working well. If you would like to let me know that something isn't working anonymously, then please log in to the gmail account listed below and send an e-mail to Kelly.L.Weinersmith@Rice.edu. I am not promising that I will change the class, but I do promise to consider your comment.

E-mail address: WeinersmithCourseComments@Gmail.com
Password: AnonymousCourseComments

You must participate in every scheduled course meeting, unless there are extenuating circumstances and I approve your absence in advance.

The information contained in this course syllabus, other than the absence policies, may be subject to change with reasonable advance notice, as deemed appropriate by the instructor.

Overview This is a one-credit laboratory course in field ecology. The purpose of the lab is to provide students hands-on experience in ecological research. This includes learning the natural history of local ecosystems, applying field methods, and testing ecological hypotheses. This will be accomplished through field experiments on campus, field trips, and an independent research project. Each lab has a 4 to 6 page report associated with it. Some labs have classroom time related to preparation and/or wrap-up.

Course Learning Goals *By the end of the course, you will be expected to be able to:*
-Generate a scientific hypothesis
-Find and understand peer-reviewed literature
-Design and conduct an experiment to test the hypothesis
-Become acquainted with techniques for measuring ecological variables
-Perform basic statistical tests
-Interpret experimental results
-Communicate your findings in a scientific report
-Communicate your findings in an oral presentation

Grading Grades will be based on a total of 1000 possible points. Late assignments will be penalized by 10% per day late. At the discretion of the instructor, unapproved absences may result in up to a 5% deduction in the final grade for the assignment to which the absence was related. **Assignments should be e-mailed to me by noon on the day they are due.**

Assignment	Points	% of final grade
Spreadsheet assignment	100	10%
Fieldtrip Report #1	100	10%
Fieldtrip Report #2	100	10%
Fieldtrip Report #3	100	10%
Independent research project	600	60%
Project proposal	150	15%
Project report	300	30%
Project presentation	150	15%
Total	**1000**	**100%**

Course Website Readings, assignments and announcements will be posted on the course's Owl-Space and (or) sent out over email.

Disabilities Any student with a disability requiring accommodations in this class is encouraged to speak with me within the first two weeks of class and also contact the Director of Disabled Student Services in the Ley Student Center.

Honor Code Collaboration with classmates is encouraged. However, use of outside resources (including published and unpublished research, websites, or personal communication) should be clearly cited on all reports. Any questions about a potential violation of the Rice University Honor Code should be brought to my attention immediately.

Schedule

Date	In class	Assignments due
January 16th	Course introduction	
January 23rd	Scientific method, statistics, and presenting results	
January 30th	Spreadsheet assignment (Lotka-Voltera predator-prey dynamics) and how to write a research proposal	
February 6th	Lab 1 – Species-area curves field trip (meet at 211B)	Spreadsheet assignment
February 13th	NO CLASS - Work on research proposal and independent projects	Lab 1 report
February 20th	NO CLASS: Work on independent projects	Research proposal
Feb 27th	Lab 2 – Demography Lab field trip (meet at 211B)	
March 6th	NO CLASS – Spring Break	
March 13th	Lab 3 – Community ecology invertebrate sampling (meet at 211B)	Lab 2 report
March 20th	NO CLASS: Work on independent projects	Lab 3 report
March 27th – April 10th	NO CLASS: Work on independent projects	
April 17th	Project Presentations	Project presentation
April 24th	NO CLASS	Project report